

IN THE CLAIMS:

Please AMEND claims 1-7, 9-14, and 16 and ADD claims 17-25 in accordance with the following:

1. (CURRENTLY AMENDED) An information storage medium ~~of reproducing that reproduces~~ information, ~~which that~~ is recorded as marks smaller than a resolution of an incidence beam, the information storage medium comprising:
a substrate having the marks thereon; and
a super resolution layer directly arranged on the substrate without any layer therebetween to reproduce the marks by generating a thermal reaction at a portion where the incidence beam is focused.
2. (CURRENTLY AMENDED) The information storage medium of claim 1, wherein the marks are formed on the substrate ~~in a~~ as pit type marks.
3. (CURRENTLY AMENDED) The information storage medium of ~~any one of~~ claims 1 ~~and~~ 2, wherein the super resolution layer is formed of ~~any one a~~ material selected from metal oxides formed of PtO_x , AuO_x , PdO_x , ~~and or~~ AgO_x , or a polymer compound, or combinations thereof.
4. (CURRENTLY AMENDED) The information storage medium of ~~any one of~~ claims 1 ~~and~~ 2, further including at least one thermal absorption layer ~~of absorbing that absorbs~~ the heat of the incidence beam.
5. (CURRENTLY AMENDED) The information storage medium of claim 4, wherein the at least one thermal absorption layer is formed of ~~any one of~~ a Ge-Sb-Te-based alloy and/or an Ag-In-Sb-Te-based alloy.
6. (CURRENTLY AMENDED) The information storage medium of claim 4, wherein a dielectric layer is arranged between the super resolution layer and ~~each of the~~ at least one thermal absorption layer.

7. (CURRENTLY AMENDED) An information storage medium ~~of reproducing that~~
~~reproduces~~ information, ~~which~~~~that~~ is recorded as marks smaller than a resolution of an
incidence beam, the information storage medium comprising:

a substrate ~~having the marks thereon~~; and
a first thermal absorption layer directly arranged on the substrate without any layer
therebetween to reproduce the marks by generating a thermal absorption at a portion where a
reproducing beam is focused.

8. (ORIGINAL) The information storage medium of claim 7 is a read only
information storage medium.

9. (CURRENTLY AMENDED) The information storage medium of ~~any one of~~
~~claims 7 and 8~~, further including a super resolution layer ~~formed on the thermal absorption layer~~
and thermally reacting with the reproducing beam.

10. (CURRENTLY AMENDED) The information storage medium of claim 9,
wherein the super resolution layer is formed of ~~any one a~~ material selected from metal oxides
formed of PtO_x , AuO_x , PdO_x , ~~and or~~ AgO_x , or a polymer compound, or combinations thereof.

11. (CURRENTLY AMENDED) The information storage medium of claim 9, further
including ~~another an~~ additional thermal absorption layer ~~on such that~~ the super resolution layer
is between the additional thermal absorption layer and first thermal layer.

12. (CURRENTLY AMENDED) The information storage medium of claim 9,
wherein the first thermal absorption layer is formed of any one of a Ge-Sb-Te-based alloy and/or
an Ag-In-Sb-Te-based alloy.

13. (CURRENTLY AMENDED) The information storage medium of claim 9,
wherein a dielectric layer is arranged between the first thermal absorption layer and the super
resolution layer.

14. (CURRENTLY AMENDED) A method of preventing a reproducing characteristic
from being deteriorated when reproducing information, ~~which~~~~that~~ is recorded as marks, from an
information storage medium including a substrate on which the marks smaller than a defined

resolution are recorded and a thermal absorption layer and/or a super resolution layer ~~possibly~~ reproducing the marks, the method comprising:

radiating a reproducing beam higher than a predetermined temperature ~~to~~ on the substrate to generate a thermal reaction on the thermal absorption layer and/or the super resolution layer; and

exhausting a heat from the reproducing beam from the substrate by omitting a layer of ~~disturbing~~that disturbs the flow of the heat from the reproducing beam between the substrate and the thermal absorption layer or the substrate and the super resolution layer.

15. (ORIGINAL) The method of claim 14, wherein the thermal absorption layer is formed of any one of a Ge-Sb-Te-based alloy and an Ag-In-Sb-Te-based alloy.

16. (CURRENTLY AMENDED) The method of ~~any one of~~ claims 14 and 15, wherein the super resolution layer is formed of ~~any one a~~ material selected from metal oxides formed of PtO_x , AuO_x , PdO_x , ~~and or~~ or AgO_x , ~~or and~~ a polymer compound.

17. (NEW) The information storage medium of claim 1, wherein the resolution of the incidence beam is $\lambda/4\text{NA}$, wherein λ is the wavelength of the incidence beam and NA is a numerical aperture of an object lens that directs the incidence beam onto the information storage medium

18. (NEW) The information storage medium of claim 11, wherein the first thermal absorption layer and the additional thermal absorption layer are independently formed of a Ge-Sb-Te-based alloy and/or an Ag-In-Sb-Te-based alloy

19. (NEW) The information storage medium of claim 11, wherein a dielectric layer is arranged between the additional thermal absorption layer and the super resolution layer.

20. (NEW) The information storage medium of claim 2, wherein the super resolution layer is formed of a material selected from metal oxides formed of PtO_x , AuO_x , PdO_x , or AgO_x , and a polymer compound.

21. (NEW) The information storage medium of claim 2, further including at least one thermal absorption layer that absorbs the heat of the incidence beam.

22. (NEW) The information storage medium of claim 8, further including a super resolution layer formed on the thermal absorption layer and thermally reacting with the reproducing beam.

23. (NEW) The method of claim 15, wherein the super resolution layer is formed of any one material selected from metal oxides formed of PtO_x , AuO_x , PdO_x , and AgO_x , or a polymer compound.

24. (NEW) An apparatus that reproduces an information storage medium, comprising:

the information storage medium of claim 1;
a light source that directs an incidence beam having a wavelength λ ; and
an object lens that concentrates the incidence beam onto the information storage medium, wherein the object lens has a numerical aperture represented by NA and wherein the resolution of the marks recorded on the information storage unit is smaller than $\lambda/4NA$.

25. (NEW) An apparatus that reproduces an information storage medium, comprising:

the information storage medium of claim 7;
a light source that directs an incidence beam having a wavelength λ ; and
an object lens that concentrates the incidence beam onto the information storage medium, wherein the object lens has a numerical aperture represented by NA and wherein the resolution of the marks recorded on the information storage unit is smaller than $\lambda/4NA$.